

**CTDEP Lean Journey: Lean II Project Team (October 2008 Kaizen Event) Summary, Quarterly Status Report – July 31, 2009**  
**Evaluation of the Solid Waste Enforcement Program**

**Project / Bureau:** Evaluation of the Solid Waste Enforcement Program

**Bureau of Materials Management & Compliance Assurance (MMCA)/Waste Engineering & Enforcement Division (WEED)**

**Team:** Total number of team members = 9 (*6 staff within Solid Waste Program / 3 staff outside Solid Waste Program*)

**Team Sponsors:** Robert Isner, Director/WEED and Diane Duva, Assistant Director/WEED

**Team Leaders:** Darlene Sage, EA/WEED

**Team Members:** Frank Gagliardo, Supervising EA/WEED; Bethany McWade, EA/WEED; Stan Gormley, EA/WEED; Gene MacGillis, EA/WEED; Laurene McEntire, Sanitary Engineer/WEED ; Joseph Schiavone, Sanitary Engineer/WEED; and Paula Guerrera, Processing Technician/WEED

**Team Champion:** Nicole Lugli, Office Director/OPPD

**Opportunity Statement:** The Solid Waste Enforcement process has many steps between inspection and draft formal action being issued. The Solid Waste Enforcement Program needs to reduce processing times and inefficiencies so that staff are freed to undertake new initiatives in compliance and enforcement such as improving recycling compliance, increasing inspection rate for permitted facilities, and closing out existing enforcement.

**Objective:** 1) Conduct Value Stream Mapping on portion of solid waste enforcement processes, specifically between inspection and decision to issue formal enforcement action; 2) Identify wastes; 3) Establish baseline measures for solid waste enforcement process; and 4) Recommend tracking system.

**Goals/Key Performance Indicators:**

Pre-Kaizen Event Goals - October 2008	Post Kaizen Event Results/Key Performance Indicators – Status: July 31, 2009
<p>Minimize number and complexity of steps in the process between inspection and issuance of draft formal action to reduce average processing time at least 30%.</p> <p>1/3 of the enforcement cases are moving in the fast lane (Actual time to issue draft formal action &lt;200 days; ERP timeframe – 180 days) while 2/3 enforcement cases are moving slower in traffic.</p>	<p>Value stream mapping resulted in a 60% reduction in the number of steps between inspection and draft formal action being issued.</p> <p><b>Revised Goal</b> – Eliminate 2/3 of pending enforcement cases moving slower in traffic.</p> <p>Over the last nine months, preliminary trend indicates new pending enforcement cases continue to move in the fast lane by less than 200 days.</p> <p>Within the last nine months, the 2/3 pending cases in traffic has decreased by 85% (14 out of 15 cases).</p> <p>Over the next three months, the remaining 1 case will move out of traffic.</p> <p><b>Revised Goal</b> – Within the next three months verify/reconcile the universe of open enforcement cases (including complaints, NOVs, Consent Orders and AG referrals).</p> <p>Within the next twelve months, reduce open enforcement cases by 10%.</p>

Pre-Kaizen Event Goals - October 2008	Post Kaizen Event Results/Key Performance Indicators – Status: July 31, 2009
Increase inspection rates of permitted facilities including recycling facilities.	<p>Established a strategic inspection schedule to increase field presence and began implementation; eliminated non-value forms, and streamlined NOV delegation of authority.</p> <p>In the first and second quarter of FY09 (6 month post LEAN event) at least 20 permitted facilities were inspected compared to 6 inspections of permitted facilities in the third and fourth quarter of FY 08 (6 month prior to LEAN event).</p> <p>Over the last three months have initiated a strategic inspection initiative for Resource Recovery Facilities.</p>
Improve recycling compliance.	Incorporated a recycling compliance component for inspections and language for Consent Orders.
Enforcement strategy.	<p><b>Revised Goal</b> - Increase use of field NOV and NONs by 50-60% within a six month time period.</p> <p>Over the last nine months 2 field NOV and 8 NONs were issued.</p>
Recommend tracking system.	<p>Within first month, established an interim tracking mechanism for solid waste enforcement cases. Over the last three months, have relied upon interim tracking mechanism as part of weekly staff meetings with supervisor. The tracking mechanism was expanded to include the hazardous waste cases and is currently being used as a tool at monthly agenda meeting.</p> <p>Over the last three months investigated the tracking capabilities of SIMS and basic case management system. Over the next three months, will continue to verify and reconcile cases and staff assignments in SIMS.</p> <p>Over the next three months, will also continue to transfer, verify and reconcile inspection and enforcement data to be imported from SIMS into a case management tracking system.</p>
Recommend Standard Operating Procedures for updating and creating written documentation of enforcement process.	Within last six months, continued developing SOPs that resulted in a mini-LEAN exercise for addressing complaints. Over the next three months will continue to review draft SOPs for management's review.

Spaghetti Diagram showing distance traveled for the enforcement process under review during the Pre-Kaizen phase: 0.98 miles. Post Kaizen phase: Did not conduct evaluation of proposed reconfiguration – expected reduction in miles based upon 60% reduction in steps.

Value Stream Mapping: The activities and steps, both value and non-value added, as shown in the Pre-Kaizen state versus Post-Kaizen desired state.		
Type of Process	Pre-Kaizen – # of Processes	Post Kaizen – # of Processes
Valued Added	47	44
No Value Added but Necessary	8	4
No Value Added	17	0
Waiting	33	4
Transport	56	12
Total	161	64
<b>Percent Reduction in the Number of Total Steps = 60% Reduction</b>		



The Post-Kaizen desired state has resulted in a number of improved program efficiencies, and include the following:
<ul style="list-style-type: none"> <li>➤ Established a systematized enforcement package to streamline the process. Includes ticklers for review deadlines and milestones.</li> <li>➤ Developed and implemented an interim tracking mechanism for enforcement cases to facilitate the timely resolution of cases.</li> <li>➤ Created a strategic inspection schedule to increase enforcement field presence and prioritize the various types of permitted solid waste facilities for inspection to assure compliance.</li> <li>➤ Incorporated a recycling component into inspections that will contribute to the state priority to increase recycling by 58% by 2024.</li> </ul>

### Highlights of the Implementation Project Plan (1, 3, 6 and 12 month deadlines)

- **One month goal** – Systematized and streamlined Program’s Enforcement File Management: created pop-up ticklers; eliminated non-value forms from enforcement package; streamlined delegation of authority for NOVs; established shared drive; revised process for generating closure letters and notice to responsible parties to improve compliance with response requirements. Established an interim tracking mechanism. Reinvigorated weekly status meetings to facilitate decision-making and consistency across cases. Developed and making use of Notice of Noncompliance – an additional informal enforcement tool for lower priority violations. **(Status: completed for all one month goals)**
- **Three month goals** – Created a strategic inspection schedule to increase enforcement field presence. Developing *Standard Operating Procedure for Administrative Enforcement Processes (SOP)*. This SOP establishes protocols for the enforcement process including case preparation, document flow, case coordination and supervisory review. Developed and implemented business recycling profile outreach and consent order language. **(Status: completed and/or ongoing for all three-month goals)**
- **Six month goals** – Updated and evaluated implementation of Field Notice of Violation and Notice of Noncompliance. Expanded use of interim tracking mechanism to include hazardous waste program and established use as tool at monthly agenda meetings. As part of continuing SOP development, conducted mini-LEAN for complaint process; exploring standardizing and merging Field NOV reports, complaints and inspection reports into one report (optimizing opportunity that solid waste program staff conduct both the inspection and develop the enforcement case). **(Status: completed and/ or ongoing for all six-month goals)**
- **Twelve month goals** – Move the outstanding cases stuck in traffic into the fast lane. Complete SOPs. Verify/Reconcile the universe of open enforcement cases (including complaints, NOVS, Consent Orders and AG referrals). Continue over next six months to reduce open enforcement cases by 10%. Standardize CO language for solid waste program specific violations and conditions. Increase use of incentivized settlements. **(Status: update Nov. 30, 2009 )**

### Additional Comments/Observations/WOWS/Innovations from the Team:

- **Value added:** *streamlined NOV package; established interim tracking; conducting weekly meetings; improving enforcement decision processes; initiating a strategic inspection schedule to increase field presence; and incorporating a recycling compliance component for inspections and enforcement actions.*
- **Equally essential in the process is having management support in accepting recommendations for change and being fully engaged in implementation.**
- **Important to keep the entire team engaged and motivated in the implementation of project goals and activities.**
- **Lessons learned from LEAN I enforcement team has assisted in this effort.**
- **There are competing demands on implementing lean and on-going work of the enforcement day to day program demands.**
- **As the project implementation moves forward, need to share work efforts with other agency enforcement programs.**
- **Always use Plan-Do-Check-Act (P-D-C-A) as project plan is being implemented.**